

Steps

- Set inequality to zero
- Factor is possible
- Set each factor equal to zero to obtain critical numbers
- Place critical numbers on number line
- Use interval testing
- Write solution using interval notation

Solve and graph all solutions.

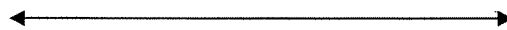
Write interval Answer below

1. $x^2 + 4x + 3 \leq 0$



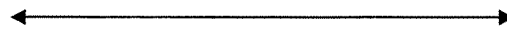
1. _____

2. $5x^2 + 10 \geq 27x$



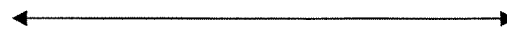
2. _____

3. $9x^2 + 6x + 1 \leq 0$



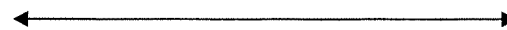
3. _____

4. $9x^2 + 31x \leq -12$



4. _____

5. $4x^2 + 4x + 1 > 0$



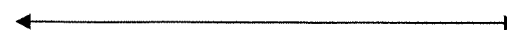
5. _____

6. $4x^2 < 9$



6. _____

7. $5 - 2x^2 \geq -3x$



7. _____

Answers:

1. $[-3, -1]$

2. $(-\infty, 2/5] \cup [5, \infty)$

3. $[-1/3]$

4. $[-3, -4/9]$

5. $(-\infty, -1/2) \cup (-1/2, \infty)$

6. $(-3/2, 3/2)$

7. $[-1, 5/2]$